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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/508,858

09/24/2004

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EXAMINER

MERKLING, MATTHEW J

ART UNIT

PAPER NUMBER

1795

MAIL DATE

DELIVERY MODE

03/26/2008

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<p align="center"><b>Advisory Action</b> <b>Before the Filing of an Appeal Brief</b></p>	<p><b>Application No.</b> 10/508,858</p>	<p><b>Applicant(s)</b> HOTTA ET AL.</p>	
	<p><b>Examiner</b> MATTHEW J. MERKLING</p>	<p><b>Art Unit</b> 1795</p>	

**--The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

THE REPLY FILED 13 March 2008 FAILS TO PLACE THIS APPLICATION IN CONDITION FOR ALLOWANCE.

1. ☒ The reply was filed after a final rejection, but prior to or on the same day as filing a Notice of Appeal. To avoid abandonment of this application, applicant must timely file one of the following replies: (1) an amendment, affidavit, or other evidence, which places the application in condition for allowance; (2) a Notice of Appeal (with appeal fee) in compliance with 37 CFR 41.31; or (3) a Request for Continued Examination (RCE) in compliance with 37 CFR 1.114. The reply must be filed within one of the following time periods:

- a) ☒ The period for reply expires 3 months from the mailing date of the final rejection.
- b) ☐ The period for reply expires on: (1) the mailing date of this Advisory Action, or (2) the date set forth in the final rejection, whichever is later. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of the final rejection.

Examiner Note: If box 1 is checked, check either box (a) or (b). ONLY CHECK BOX (b) WHEN THE FIRST REPLY WAS FILED WITHIN TWO MONTHS OF THE FINAL REJECTION. See MPEP 706.07(f).

Extensions of time may be obtained under 37 CFR 1.136(a). The date on which the petition under 37 CFR 1.136(a) and the appropriate extension fee have been filed is the date for purposes of determining the period of extension and the corresponding amount of the fee. The appropriate extension fee under 37 CFR 1.17(a) is calculated from: (1) the expiration date of the shortened statutory period for reply originally set in the final Office action; or (2) as set forth in (b) above, if checked. Any reply received by the Office later than three months after the mailing date of the final rejection, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**NOTICE OF APPEAL**

2. ☐ The Notice of Appeal was filed on \_\_\_\_\_. A brief in compliance with 37 CFR 41.37 must be filed within two months of the date of filing the Notice of Appeal (37 CFR 41.37(a)), or any extension thereof (37 CFR 41.37(e)), to avoid dismissal of the appeal. Since a Notice of Appeal has been filed, any reply must be filed within the time period set forth in 37 CFR 41.37(a).

**AMENDMENTS**

3. ☒ The proposed amendment(s) filed after a final rejection, but prior to the date of filing a brief, will not be entered because
- (a) ☒ They raise new issues that would require further consideration and/or search (see NOTE below);
- (b) ☐ They raise the issue of new matter (see NOTE below);
- (c) ☐ They are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal; and/or
- (d) ☐ They present additional claims without canceling a corresponding number of finally rejected claims.

NOTE: See Continuation Sheet. (See 37 CFR 1.116 and 41.33(a)).

4. ☐ The amendments are not in compliance with 37 CFR 1.121. See attached Notice of Non-Compliant Amendment (PTOL-324).
5. ☐ Applicant's reply has overcome the following rejection(s): \_\_\_\_\_.
6. ☐ Newly proposed or amended claim(s) \_\_\_\_\_ would be allowable if submitted in a separate, timely filed amendment canceling the non-allowable claim(s).
7. ☒ For purposes of appeal, the proposed amendment(s): a) ☒ will not be entered, or b) ☐ will be entered and an explanation of how the new or amended claims would be rejected is provided below or appended.
- The status of the claim(s) is (or will be) as follows:
- Claim(s) allowed: NONE.
- Claim(s) objected to: NONE.
- Claim(s) rejected: 1-11.
- Claim(s) withdrawn from consideration: NONE.

**AFFIDAVIT OR OTHER EVIDENCE**

8. ☐ The affidavit or other evidence filed after a final action, but before or on the date of filing a Notice of Appeal will not be entered because applicant failed to provide a showing of good and sufficient reasons why the affidavit or other evidence is necessary and was not earlier presented. See 37 CFR 1.116(e).
9. ☐ The affidavit or other evidence filed after the date of filing a Notice of Appeal, but prior to the date of filing a brief, will not be entered because the affidavit or other evidence failed to overcome all rejections under appeal and/or appellant fails to provide a showing a good and sufficient reasons why it is necessary and was not earlier presented. See 37 CFR 41.33(d)(1).
10. ☐ The affidavit or other evidence is entered. An explanation of the status of the claims after entry is below or attached.

**REQUEST FOR RECONSIDERATION/OTHER**

11. ☒ The request for reconsideration has been considered but does NOT place the application in condition for allowance because:  
See Continuation Sheet.
12. ☐ Note the attached Information *Disclosure Statement*(s). (PTO/SB/08) Paper No(s). \_\_\_\_\_
13. ☐ Other: \_\_\_\_\_.

/Alexa D. Neckel/  
Supervisory Patent Examiner, Art Unit 1795

/M. J. M./  
Examiner, Art Unit 1795

Continuation of 3. NOTE: Applicant's amendment of claim 1 which includes the limitation "only" in line 4 of claim 1 to recite read "the second end of the heat exchanger and only a bottom of the outer casing being fixed to each other by a flange and a double piping having an inner tube and an outer tube". The limitation "only" adds a limitation that was not present in the finally rejected claims and would therefore require further consideration.

Continuation of 11. does NOT place the application in condition for allowance because: On page 5, last paragraph of Applicant's reply (filed 3/13/08), Applicant argues that "Christensen at least fails to disclose that only a bottom of the outer casing is being fixed to each other by a flange". While this limitation does appear to overcome the rejection under 35 USC §102(b) in view of Christensen as presently applied, the examiner would like to point out that the added limitation of "only" regarding the connection between the second end of the heat exchanger and the bottom of the outer casing appears to raise a new matter issue under 35 USC §112 1<sup>st</sup> Paragraph. By using the claim language "only", Applicant is presenting a limitation that was not disclosed in the specification as originally filed. In other words, Applicant is excluding all structures in which the second end of the heat exchanger is not "only" connected to the bottom of the outer casing and a double piping. This originally filed disclosure does not include this exclusion.

On page 6 of Applicant's reply, Applicant argues that Christensen does not teach the claimed sequential arrangement of steps. The examiner respectfully disagrees with this argument. As disclosed in the Final Office Action (mailed 12/13/07), the examiner directs Applicant's attention to the flow direction diagram of Christensen which clearly discloses passing the gas to be treated sequentially into one tube of the inner tube and the outer tube in the double piping (gas is passed through the inner tube, via conduit 49), the heat exchanger (the gas exits inlet conduit 50 and enters the shell side of the heat exchanger), a reactor with a heater (the gas then enters into the reactor 11, where a heater 7 supplies heat to the gas prior to catalyst entrance), the heat exchanger (after passing through the reactor 11, the gas passed down through the tube side 21 of the heat exchanger) and the other tube of the inner tube and the outer tube in the double piping (gas exits through the annular space in the double piping, see Fig. 2 for the flow directions).